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APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
09/400,583	09/22/1999	FREDERICK D. BUSCHE	CR9-99-049	3571

7590 08/27/2002

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EXAMINER

KEMPER, MELANIE A

ART UNIT	PAPER NUMBER
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3622

DATE MAILED: 08/27/2002

Please find below and/or attached an Office communication concerning this application or proceeding.

Office Action Summary

Application No.

09/400,583

Applicant(s)

BUSCHE ET AL.

Examiner

M Kemper

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-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --

Period for Reply

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If the period for reply specified above is less than thirty (30) days, a reply within the statutory minimum of thirty (30) days will be considered timely.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133).
- Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

Status

- 1) ☒ Responsive to communication(s) filed on 11 June 2002.
- 2a) ☒ This action is **FINAL**. 2b) ☐ This action is non-final.
- 3) ☐ Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

Disposition of Claims

- 4) ☒ Claim(s) 2-5,7-13,17-20 and 22-28 is/are pending in the application.
- 4a) Of the above claim(s) _____ is/are withdrawn from consideration.
- 5) ☐ Claim(s) _____ is/are allowed.
- 6) ☒ Claim(s) 2-5,7-13,17-20,22-28 is/are rejected.
- 7) ☐ Claim(s) _____ is/are objected to.
- 8) ☐ Claim(s) _____ are subject to restriction and/or election requirement.

Application Papers

- 9) ☐ The specification is objected to by the Examiner.
- 10) ☐ The drawing(s) filed on _____ is/are: a) ☐ accepted or b) ☐ objected to by the Examiner.
- Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).
- 11) ☐ The proposed drawing correction filed on _____ is: a) ☐ approved b) ☐ disapproved by the Examiner.
- If approved, corrected drawings are required in reply to this Office action.
- 12) ☐ The oath or declaration is objected to by the Examiner.

Priority under 35 U.S.C. §§ 119 and 120

- 13) ☐ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).
- a) ☐ All b) ☐ Some * c) ☐ None of:
1. ☐ Certified copies of the priority documents have been received.
2. ☐ Certified copies of the priority documents have been received in Application No. _____.
3. ☐ Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).
- * See the attached detailed Office action for a list of the certified copies not received.
- 14) ☐ Acknowledgment is made of a claim for domestic priority under 35 U.S.C. § 119(e) (to a provisional application).
- a) ☐ The translation of the foreign language provisional application has been received.
- 15) ☐ Acknowledgment is made of a claim for domestic priority under 35 U.S.C. §§ 120 and/or 121.

Attachment(s)

- 1) ☐ Notice of References Cited (PTO-892)
- 2) ☐ Notice of Draftsperson's Patent Drawing Review (PTO-948)
- 3) ☐ Information Disclosure Statement(s) (PTO-1449) Paper No(s) _____.
- 4) ☐ Interview Summary (PTO-413) Paper No(s). _____.
- 5) ☐ Notice of Informal Patent Application (PTO-152)
- 6) ☐ Other: _____.

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1. The following is a quotation of the appropriate paragraphs of 35 U.S.C. 102 that form the basis for the rejections under this section made in this Office action:

A person shall be entitled to a patent unless –

(e) the invention was described in a patent granted on an application for patent by another filed in the United States before the invention thereof by the applicant for patent, or on an international application by another who has fulfilled the requirements of paragraphs (1), (2), and (4) of section 371(c) of this title before the invention thereof by the applicant for patent.

The changes made to 35 U.S.C. 102(e) by the American Inventors Protection Act of 1999 (AIPA) do not apply to the examination of this application as the application being examined was not (1) filed on or after November 29, 2000, or (2) voluntarily published under 35 U.S.C. 122(b). Therefore, this application is examined under 35 U.S.C. 102(e) prior to the amendment by the AIPA (pre-AIPA 35 U.S.C. 102(e)).

2. Claims 7-13, 22-27 are rejected under 35 U.S.C. 102(e) as being clearly anticipated by Hughes et al., patent number 5,920,261.

Hughes et al. teaches determining data relationships including determining (identifying) locations of products (see at least col. 1, lines 40-50, col. 2, lines 5-10, col. 6, lines 1-60, col. 13, lines 25-55, col. 15, lines 15-50), recording (identifying) paths of customers (see at least col. 18, lines 15-17, 35-40, col. 15, lines 15-50), associating the locations of products with the paths of customers as claimed (see at least col. 16, line 40 – col. 17, line 50, col. 18, lines 19-23, col. 20, lines 10-15, 25-65) which employs data mining algorithms to generate input data for forming the set of spatial relationships (see at least col. 17, lines 5-20, 30-45, col. 20, lines 10-15, 25-60) and spatial analysis algorithms to from the set of spatial relationships (see at least col. 20, lines 40-50, col. 19, lines 1-35, col. 13, lines 25-45, col. 18, lines 15-40).

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3. The following is a quotation of 35 U.S.C. 103(a) which forms the basis for all obviousness rejections set forth in this Office action:

(a) A patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, if the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the invention was made to a person having ordinary skill in the art to which said subject matter pertains. Patentability shall not be negated by the manner in which the invention was made.

4. Claims 2-5, 17-20 are rejected under 35 U.S.C. 103(a) as being unpatentable over Hughes et al., patent number 5,920,261 in view of Abell, WO 98/38589.

Hughes substantially teaches the invention as shown above, but does not teach identifying customers within a retail space. Abell teaches identifying customers within a retail space (see at least pp. 3-6, 9-10, 21). It would have been obvious to one having ordinary skill in the art at the time of the invention to have used the customer identification of Abell in the system of Hughes since the customer identification would have aided in the floor plan of items of Hughes to plan the location of items in the store based upon the customers or class of customer who is most likely to see an item as suggested by Abell.

5. Claim 28 is rejected under 35 U.S.C. 103(a) as being unpatentable over Hughes, patent number 5,920,261 in view of Fano, patent number 6,317,718.

Hughes substantially teaches the invention as shown above, but does not teach use of a gps. Fano teaches determining shopper location using gps (see at least abstract, col. 2, lines 20-40). It would have been obvious to one having ordinary skill in the art at the time of the invention to have used the gps of Fano in the location determination of Hughes since the gps receiver offers the advantage of

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not requiring special equipment over the store as suggested by Fano or since the gps would have offered user assistance in identifying locations of desired items.

6. Applicant's arguments filed on 6/11/02 have been fully considered but they are not persuasive. The applicant argues that Hughes does not teach data mining algorithms to generate input data for forming the set of spatial relationships in col. 17 since it does not include the use of customer patterns within the store. However, the passages in col. 17 do meet this claim limitation since customer patterns are included in terms of traffic area (see also col. 20, lines 10-40) which include customer paths. In this case, data mining tools are used to measure and analyzed facility performance by associating the object location to traffic (path) data.

The passages of the present specification cited by the applicant are not persuasive to the arguments concerning the differences between the application and the applied art. The first passage listed on p. 9 is an introductory statement concerning the relationship of the placement of products and the customers. The second passage states that data mining algorithms are used to generate input data for forming a set of product and customer relationships (where it is not clear that this is the same as forming a set of spatial relationships). Further, Hughes teaches the products chosen for purchase by the customers are identified and the locations of the products are associated with the paths to form a set of spatial relationships (see at least col. 17, lines 34-36, col. 18, lines 20-23, col. 20, lines 25-30). The third passage does not relate customer paths to product location. None of the passages listed provide a specific

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algorithm. The claims, then, include any type of data mining method to associate the paths to the location of products. As shown above and giving the broadest reasonable interpretation to the claims, Hughes teaches data mining to associate the paths of customers to the location of products to observe buying patterns and facility performance.

7. **THIS ACTION IS MADE FINAL.** Applicant is reminded of the extension of time policy as set forth in 37 CFR 1.136(a).

A shortened statutory period for reply to this final action is set to expire **THREE MONTHS** from the mailing date of this action. In the event a first reply is filed within **TWO MONTHS** of the mailing date of this final action and the advisory action is not mailed until after the end of the **THREE-MONTH** shortened statutory period, then the shortened statutory period will expire on the date the advisory action is mailed, and any extension fee pursuant to 37 CFR 1.136(a) will be calculated from the mailing date of the advisory action. In no event, however, will the statutory period for reply expire later than **SIX MONTHS** from the mailing date of this final action.

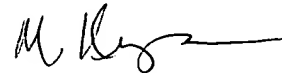
Any inquiry concerning this communication or earlier communications from the examiner should be directed to M Kemper whose telephone number is 703-305-9589. The examiner can normally be reached on M-F (9:00-5:30).

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Eric W. Stamber can be reached on 703-305-8469. The fax phone numbers

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for the organization where this application or proceeding is assigned are 703-872-9326 for regular communications and 703-872-9327 for After Final communications.

Any inquiry of a general nature or relating to the status of this application or proceeding should be directed to the receptionist whose telephone number is 703-308-1113.



M Kemper
Primary Examiner
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MK
August 26, 2002